

REMARKS

In the Official Action mailed **November 26, 2002**, the Examiner reviewed claims 1-24. Claims 1, 4-5, 7-9, 12-13, 15-17, 20-21 and 23-24 were rejected under 35 U.S.C. 103(a) as being unpatentable over Maier et al (USPN 5,625,815, hereinafter "Maier") in view of Park et al (USPN 6,064,951, hereinafter "Park"). Claims 2-3, 6, 10-11, 14, 18-19, and 22 were rejected under 35 U.S.C. 103(a) as being unpatentable over Maier in view of Cochrane et al. (USPN 5,987,455, hereinafter "Cochrane")

Rejections under 35 U.S.C. § 103(a)

Independent claims 1, 9, and 17 were rejected as being unpatentable over Maier in view of Park.

Applicant respectfully points out that Maier teaches a transaction manager that creates audit entries for each transaction (see Maier, col. 4, lines 7-12). In contrast, the present invention discloses creating an audit record only for rows where auditing is enabled (see page 7, line 18 to page 8, line 2 of the instant application). Creating an audit record only if auditing is enabled is advantageous because it prevents the system from creating an audit record in cases where sensitive data is not accessed, thereby saving space in the audit trail. Neither Maier nor Park, either separately or in concert, suggest or imply an advantage for creating an audit record only for rows where auditing is enabled.

Accordingly, Applicant has amended Independent claims 1, 9, and 17 to clarify that the present invention creates an audit record only for rows where auditing is enabled, and only for rows that are actually accessed. These amendments find support on page 7, line 18 to page 8, line 2, and in claims 3, 11, and 19 of the instant application. Claims 3, 11, and 19 have been amended to reflect the changes made to claims 1, 9, and 17, respectively.

Hence, Applicant respectfully submits that independent claims 1, 9, and 17 as presently amended are in condition for allowance. Applicant also submits that claims 2-8, which depend upon claim 1, claims 10-16, which depend upon claim 9, and claims 18-24, which depend upon claim 17 are for the same reasons in

condition for allowance and for reasons of the unique combinations recited in such claims.

Version with markings to show changes made

The claims:

1 1. (Twice Amended) A method for selectively auditing accesses to a
2 relational database, comprising:
3 receiving a query for the relational database;
4 automatically modifying the query prior to processing the query, so that
5 processing the query causes an audit record to be created and recorded only for
6 rows in relational tables that are actually accessed by the query and that satisfy an
7 auditing condition, wherein satisfying the auditing condition allows selective
8 auditing of the query;
9 processing the modified query to produce a query result, wherein processing
10 the modified query includes,
11 creating the audit record for rows in relational tables that are
12 accessed by the query and that satisfy the auditing condition, and
13 recording the audit record in an audit record store; and
14 returning the query result.

1 3. (Once Amended) The method of claim 2, further comprising ensuring
2 that the case statement is evaluated near the end of the query processing so that the
3 case statement is evaluated only after other conditions of the query are satisfied, ~~so~~
4 ~~that the audit record is created only for rows that are actually accessed by the query.~~

1 9. (Twice Amended) A computer-readable storage medium storing
2 instructions that when executed by a computer cause the computer to perform a
3 method for selectively auditing accesses to a relational database, the method
4 comprising:
5 receiving a query for the relational database;
6 automatically modifying the query prior to processing the query, so that
7 processing the query causes an audit record to be created and recorded only for
8 rows in relational tables that are actually accessed by the query and that satisfy an
9 auditing condition, wherein satisfying the auditing condition allows selective
10 auditing of the query;

11 processing the modified query to produce a query result, wherein processing
12 the modified query includes,
13 creating the audit record for rows in relational tables that are
14 accessed by the query and that satisfy the auditing condition, and
15 recording the audit record in an audit record store; and
16 returning the query result.

1 11. (Once Amended) The computer-readable storage medium of claim 10,
2 wherein the method further comprises ensuring that the case statement is evaluated
3 near the end of the query processing to that the case statement is evaluated only
4 after other conditions of the query are satisfied, ~~so that the audit record is created~~
5 ~~only for rows that are actually accessed by the query.~~

1 17. (Twice Amended) An apparatus that selectively audits accesses to a
2 relational database, comprising:
3 a receiving mechanism that is configured to receive a query for the
4 relational database;
5 a query modification mechanism that is configured to automatically modify
6 the query, prior to processing the query, so that processing the query causes an
7 audit record to be created and recorded only for rows in relational tables that are
8 actually accessed by the query and that satisfy an auditing condition, wherein
9 satisfying the auditing condition allows selective auditing of the query;
10 a query processor that is configured to process the modified query to
11 produce a query result, wherein processing the modified query includes,
12 creating the audit record for rows in relational tables that are
13 accessed by the query and that satisfy the auditing condition, and
14 recording the audit record in an audit record store; and
15 a returning mechanism that is configured to return the query result.

1 19. (Once Amended) The apparatus of claim 18, wherein the query
2 modification mechanism is configured to ensure that the case statement is evaluated
3 near the end of the query processing so that the case statement is evaluated only

- 4 after other conditions of the query are satisfied, ~~so that the audit record is created~~
5 ~~only for rows that are actually accessed by the query.~~

CONCLUSION

Please enter this amendment into record rather than the amendment filed on January 23, 2003. It is submitted that the application is presently in form for allowance. Such action is respectfully requested.

Respectfully submitted,

By



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